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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER

SHOSHO, CALLIE E

ART UNIT	PAPER NUMBER
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1714

DATE MAILED: 12/01/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/730,353

Applicant(s)

BROWN ET AL.

Examiner

Callie E. Shosho

Art Unit

1714

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 14 September 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4,6,8-10,18 and 19 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4,6,8-10,18 and 19 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. All outstanding rejections are overcome by applicants' amendment filed 9/14/06.

The new grounds of rejection set forth below are necessitated by applicants' amendment and thus, the following action is final.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claim 6 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 6, which depends on claim 1, recites "wherein said polymer particles having first phosphorous acid groups have a glass transition temperature of at least 35 °C". Claim 1 discloses polymer particles that are multistage polymer particles comprising first polymer having first phosphorous acid groups and having glass transition temperature of from -60 to 35 °C and second polymer having a glass transition temperature of from -60 to 35 °C. Thus, the scope of claim 6 is confusing because it is not clear how the polymer particles having first phosphorous acid groups of claim 6 can have a glass transition temperature of "at least 35 °C" when the polymer particles are comprised of two polymers that each possess glass transition temperature of -60 to 35 °C. Clarification is requested.

Double Patenting

4. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the “right to exclude” granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

5. Claims 1-4, 6, 8-10, and 18-19 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claim 1 of copending Application No. 10/642,791 in view of Dersch et al. (U.S. 6,492,451)

Copending 10/642,791 discloses polymer composition comprising multistage polymer particles comprising first polymer comprising polymerized unit of multiethylenically unsaturated monomer and at least one pendant absorbing group of phosphorous acid wherein the first polymer has a glass transition temperature (T_g) of from -60 °C to 35 °C and a second polymer having a glass transition temperature of from -60 °C to 35 °C wherein the second polymer is substantially free of the at least one pendant absorbing group. It is also disclosed that the average weight ratio of the first polymer to the second polymer is in the range of from 1:2 to 1:20.

The difference between copending 10/642,791 and the present claimed invention is the requirement in the claims (a) organic colorant, (b) that the first polymer comprises polymerized units of phosphorous acid monomer, (c) that the polymer particles are prepared by aqueous emulsion polymerization of phosphorous acid monomer at pH less than 2 and/or the polymer composition comprises level of water-soluble polymer having second phosphorous acid groups defined by ratios of equivalents of second phosphorous acid groups to equivalents of first phosphorous acid groups in the range of less than or equal to 1.5, (d) of white pigment as well as amounts of white pigment and polymer particles, and (e) of ink jet ink (claim 10).

With respect to difference (a), Dersch et al., which is drawn to pigmented coating composition comprising polymer particles comprised of polymerized units of phosphorous acid monomer and having first phosphorous acid groups, disclose the use of colored organic pigment in order to adjust the hiding power, the shade, and the depth of color of the composition (col.10,

lines 11-16). It would have been within the skill level of, as well as obvious to, one of ordinary skill in the art to choose amounts of colored organic pigment depending on the desired hiding power, shade and color depth of the composition.

In light of the above, it therefore would have been obvious to one of ordinary skill in the art to use colored organic pigment in copending 10/642,791 in order to produce ink with desired hiding powder, shade, and depth, and thereby arrive at the claimed invention.

With respect to difference (b), it is noted that the present claims require multistage polymer particles wherein the first polymer comprises polymerized units of phosphorous acid monomer while copending 10/642,791 discloses multistage polymer particles wherein the first polymer comprises at least one pendant absorbing group including phosphorous acid groups.

Applicants' attention is drawn to MPEP 804 where it is disclosed that "the specification can always be used as a dictionary to learn the meaning of a term in a patent claim." *In re Boylan*, 392 F.2d 1017, 157 USPQ 370 (CCPA 1968). Further, those portions of the specification which provide support for the patent claims may also be examined and considered when addressing the issue of whether a claim in an application defines an obvious variation of an invention claimed in the patent. (underlining added by examiner for emphasis) *In re Vogel*, 422 F.2d 438, 164 USPQ 619, 622 (CCPA 1970).

Consistent with the above underlined portion of the MPEP citation, attention is drawn to page 19, lines 9-10 of copending 10/642,791 that discloses that phosphorous acid absorbing groups are incorporated into the first polymer by polymerization of phosphorous acid monomer.

In light of the above, it is clear that the multistage polymer particles of copending 10/642,791 do in fact comprise polymerized units of phosphorous acid monomer and thus, one of ordinary skill in the art would have arrived at the claimed invention from the copending one.

With respect to difference (c), applicants' attention is drawn to MPEP 804 where it is disclosed that "the specification can always be used as a dictionary to learn the meaning of a term in a patent claim." *In re Boylan*, 392 F.2d 1017, 157 USPQ 370 (CCPA 1968). Further, those portions of the specification which provide support for the patent claims may also be examined and considered when addressing the issue of whether a claim in an application defines an obvious variation of an invention claimed in the patent (underlining added by examiner for emphasis) *In re Vogel*, 422 F.2d 438, 164 USPQ 619,622 (CCPA 1970).

Consistent with the above underlined portion of the MPEP citation, attention is drawn to page 23, 2nd full paragraph, page 24, 1st full paragraph, page 25, 1st full paragraph and page 26, 2nd paragraph of copending 10/642,791 which discloses that the polymer particles are in produced using aqueous emulsion polymerization at pH less than 2 in order to minimize formation of water-soluble polymer which prevents flocculation of pigment in the composition. It is disclosed that the aqueous composition is substantially free of water-soluble polymer having second phosphorous acid groups which refers to levels of water-soluble polymer having second phosphorous acid groups defined by ratios of equivalents of second phosphorous acid groups to equivalents of first phosphorous acid groups in the range of less than or equal to 1.5.

In light of the above, it therefore would have been obvious to one of ordinary skill in the art to produce the polymer particles of copending 10/642,791 using aqueous emulsion polymerization at pH less than 2 in order to minimize formation of water-soluble polymer and

thus prevent flocculation of pigment present in the composition, and thereby arrive at the claimed invention from the copending one.

With respect to difference (d), applicants' attention is drawn to MPEP 804 where it is disclosed that "the specification can always be used as a dictionary to learn the meaning of a term in a patent claim." *In re Boylan*, 392 F.2d 1017, 157 USPQ 370 (CCPA 1968). Further, those portions of the specification which provide support for the patent claims may also be examined and considered when addressing the issue of whether a claim in an application defines an obvious variation of an invention claimed in the patent. (underlining added by examiner for emphasis) *In re Vogel*, 422 F.2d 438, 164 USPQ 619, 622 (CCPA 1970).

Consistent with the above underlined portion of the MPEP citation, attention is drawn to page 1, second-fourth paragraphs, page 3, first full paragraph, paragraph bridging pages 13-14, paragraph bridging pages 27-28, page 29, first full paragraph, and page 41, line 11 of copending 10/642,791 which discloses the use white pigment in order to produce composition with desired hiding power and the use of multistage polymer particles in order to produce composition with good film properties, hiding power, and gloss.

In light of the above, it therefore would have been obvious to one of ordinary skill in the art to use white pigment in the composition of copending 10/642,791 as well as to use white pigment and multistage polymer particles in amounts, including those presently claimed, in order to produce composition with good hiding power, gloss, and film properties, and thereby arrive at the claimed invention from the copending one.

With respect to difference (e), it is noted that there is no disclosure in copending 10/642,791 that the polymer composition is an ink jet ink as presently claimed. However,

applicants attention is drawn to MPEP 2111.02 which states that “if the body of a claim fully and intrinsically sets forth all the limitations of the claimed invention, and the preamble merely states, for example, the purpose or intended use of the invention, rather than any distinct definition of any of the claimed invention’s limitations, then the preamble is not considered a limitation and is of no significance to claim construction”. Further, MPEP 2111.02 states that statements in the preamble reciting the purpose or intended use of the claimed invention must be evaluated to determine whether the purpose or intended use results in a structural difference between the claimed invention and the prior art. Only if such structural difference exists, does the recitation serve to limit the claim. If the prior art structure is capable of performing the intended use, then it meets the claim.

It is the examiner’s position that the preamble does not state any distinct definition of any of the claimed invention’s limitations and further that the purpose or intended use, i.e. ink jet ink, recited in the present claim does not result in a structural difference between the presently claimed invention and the prior art composition. Given that, as discussed above, copending 10/642,791 disclose composition as presently claimed, i.e. comprising multistage polymer particles and colorant, it is clear that the composition of copending 10/642,791 would be capable of performing the intended use, i.e. ink jet ink, presently claimed as required in the above cited portion of the MPEP, and thus, one of ordinary skill in the art would have arrived at the claimed invention.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

6. Claims 1-4, 6, 8-10, and 18-19 are directed to an invention not patentably distinct from claim 1 of commonly assigned 10/642,791 in view of Dersch et al. For an explanation of the rejection, see paragraph 5 above.

7. The U.S. Patent and Trademark Office normally will not institute an interference between applications or a patent and an application of common ownership (see MPEP Chapter 2300). Commonly assigned 10/642,791, discussed above, would form the basis for a rejection of the noted claims under 35 U.S.C. 103(a) if the commonly assigned case qualifies as prior art under 35 U.S.C. 102(e), (f) or (g) and the conflicting inventions were not commonly owned at the time the invention in this application was made. In order for the examiner to resolve this issue, the assignee can, under 35 U.S.C. 103(c) and 37 CFR 1.78(c), either show that the conflicting inventions were commonly owned at the time the invention in this application was made, or name the prior inventor of the conflicting subject matter.

A showing that the inventions were commonly owned at the time the invention in this application was made will preclude a rejection under 35 U.S.C. 103(a) based upon the commonly assigned case as a reference under 35 U.S.C. 102(f) or (g), or 35 U.S.C. 102(e) for applications pending on or after December 10, 2004.

8. Claims 1-4, 6, 8-10, and 18-19 are provisionally rejected under 35 U.S.C. 103(a) as being obvious over copending Application No. 10/642,791 which has a common inventor with the instant application in view of Dersch et al. (U.S. 6,492,451). Based upon the earlier effective U.S. filing date of the copending application, it would constitute prior art under 35 U.S.C. 102(e)

if published or patented. This provisional rejection under 35 U.S.C. 103(a) is based upon a presumption of future publication or patenting of the conflicting application. For an explanation of the rejection see paragraph 5 above.

This provisional rejection might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the copending application was derived from the inventor of this application and is thus not the invention "by another," or by a showing of a date of invention for the instant application prior to the effective U.S. filing date of the copending application under 37 CFR 1.131. This rejection might also be overcome by showing that the copending application is disqualified under 35 U.S.C. 103(c) as prior art in a rejection under 35 U.S.C. 103(a). See MPEP § 706.02(l)(1) and § 706.02(l)(2).

Claim Rejections - 35 USC § 102

9. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

10. Claim 18 is rejected under 35 U.S.C. 102(b) as being anticipated by Ma et al. (U.S. 6,247,808).

Ma et al. disclose ink jet ink comprising organic pigment and polymer having first phosphorous acid groups obtained from monomer such as vinyl phosphonic acid (col.4, lines 25-30 and 49-54, col.6, lines 29-30 and 42-46, and col.8, lines 12-16 and 44). It is noted that there is no disclosure in Ma et al. of water-soluble polymer having second phosphorous acid groups and

thus, clearly the ratio of equivalents of second phosphorous acid groups to equivalents of first phosphorous acid groups is less than 1.5 as presently claimed.

In light of the above, it is clear that Ma et al. anticipate the present claims.

11. Claims 18-19 are rejected under 35 U.S.C. 102(e) as being anticipated by Dersch et al. (U.S. 6,492,451).

Dersch et al. disclose pigmented coating composition comprising organic pigment and polymer particles comprised of polymerized units of phosphorous acid monomer and having first phosphorous acid groups wherein the polymer possesses glass transition temperature of -60 to 80°C (col.1, lines 4-7, col.2, lines 30-36, col.3, lines 1-5 and 59-64, col.9, lines 35-63, col.10, lines 1-16, and col.11, lines 57-67). It is noted that there is no disclosure in Dersch et al. of water-soluble polymer having second phosphorous acid groups and thus, clearly the ratio of equivalents of second phosphorous acid groups to equivalents of first phosphorous acid groups is less than 1.5 as presently claimed.

In light of the above, it is clear that Dersch et al. anticipate the present claims.

12. Claims 1-4, 6, 8-10, and 18-19 are rejected under 35 U.S.C. 102(e) as being anticipated by Edwards et al. (U.S. 7,101,921).

Edwards et al. disclose polymer composition comprising 0-85 vol.% pigment including organic pigment and inorganic pigment, water-soluble polymer such as polyacrylic acid, and 10-70 wt.% core-shell polymer comprising 10-70% first polymer that is obtained from 85-99.9% co-monomer, 0.1-5% anionic monomer that is phosphorous acid monomer, and 0.1-10%

multiethylenically unsaturated monomer and possessing glass transition temperature of -30 to 100°C and 30-90% second polymer obtained from 70-99% co-monomer, 0.5-7% anionic monomer that is phosphorous acid monomer, and 1-20% crosslinking monomer. It is calculated that the ratio of first polymer to second polymer is 1/0.43 to 1/9. Further, it is calculated that the second polymer contains 10% (0.5/5) of the amount of phosphorus acid monomer contained in the first polymer (col.1, lines 9-15, col.1, line 61-col.2, line 8, col.4, lines 18-20, col.5, lines 36-64, col.6, lines 4-16, 37-39, and 40-52, col.7, lines 1-8, col.9, lines 43-46 and 51, and col.10, line 63). It is noted that the water-soluble polymer of Edwards et al. does not contain second phosphorous acid groups and thus, clearly the ratio of equivalents of second phosphorous acid groups to equivalents of first phosphorous acid groups is less than 1.5 as presently claimed.

It is noted that the amount of multistage polymer particles disclosed by Edwards et al. are in wt.% while the present claims require the amounts in vol.%. However, given the broad range of polymer particles presently claimed, and absent evidence to the contrary, it is clear that the amount of multistage polymer particles disclosed by Edwards et al. would fall within the presently claimed ranges.

In light of the above, it is clear that Edwards et al. anticipate the present claims.

Claim Rejections - 35 USC § 103

13. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

14. Claims 1-4, 6, 8-10, and 18-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brown et al. (U.S. 2004/0054063) in view of Dersch et al. (U.S. 6,492,451)

Brown et al. disclose polymer composition comprising polymer particles comprised of polymerized units of phosphorous acid monomer and having first phosphorous acid groups wherein the polymer particles are prepared by aqueous emulsion polymerization of the phosphorous acid monomer at pH less than 2 and the polymer composition comprises level of water-soluble polymer having second phosphorus acid groups defined by ratio of equivalents of second phosphorous acid groups to equivalents of first phosphorous acid groups in range of less than or equal to 1.5. It is disclosed that the polymer particles are multistage polymer particles comprising first polymer obtained from multiethylenically unsaturated monomer and phosphorous acid monomer wherein the first polymer has a glass transition temperature (T_g) of from -60 °C to 35 °C and the second polymer has T_g of from -60 °C to 35 °C wherein the weight percent of first phosphorus acid groups in the second polymer is 10% or less of the weight percent of the first phosphorus acid groups in the first polymer. It is also disclosed that the average weight ratio of the first polymer to the second polymer is from 1:2 to 1:20. It is also disclosed that the composition comprises colorant and white pigment (paragraphs 10, 27-29, 44, 46-48, 52, 61-64, 73, 77, 79, 81, 89, and 117 (lines 3-4).

Attention is drawn to paragraphs 169-175 of Brown et al. which disclose polymer composition comprising titanium dioxide and multistage polymer particle as presently claimed. Further, using amounts disclosed in paragraphs 170, 171, and 175, it is disclosed that the polymer composition, i.e. paint, is obtained by adding 50.23 g of aqueous dispersion comprising titanium dioxide and multistage polymer particles with 39.09 g master paint comprising black

pigment. The aqueous dispersion comprises approximately 32 wt. %

$((0.765 \times 40.73) / (40.73 + 56.65))$ titanium dioxide and approximately 19 wt. %

$((0.33 \times 56.65) / (40.73 + 56.65))$ multistage polymer particles and thus, it is calculated that the polymer composition or paint comprises approximately 18 wt. % $((0.32 \times 50.23) / (50.23 + 39.09))$

titanium dioxide and 11 wt. % $((0.19 \times 50.23) / (50.23 + 39.09))$ multistage polymer particles. It is noted that the amounts of titanium dioxide and multistage polymer particles disclosed by Brown et al. are in wt. % while the present claims require the amounts in vol. %. However, given the broad range of titanium dioxide, i.e. white pigment, and polymer particles presently claimed, and absent evidence to the contrary, it is clear that the amounts of titanium dioxide and multistage polymer particles disclosed by Brown et al. would fall within the presently claimed ranges.

The difference between Brown et al. and the present claimed invention is the requirement in the claims of (a) organic colorant pigment and (b) ink jet ink.

With respect to difference (a), it is noted that Brown et al. disclose that the composition contains other pigments (paragraph 117).

Dersch et al., which is drawn to pigmented coating composition comprising polymer particles comprised of polymerized units of phosphorous acid monomer and having first phosphorous acid groups, disclose the use of colored organic pigment in addition to inorganic pigment in order to adjust the hiding power, the shade, and the depth of color of the composition (col.10, lines 11-16).

In light of the above, it therefore would have been obvious to one of ordinary skill in the art to use colored organic pigment in the ink of Brown et al. in order to produce ink with desired hiding powder, shade, and color depth, and thereby arrive at the claimed invention.

With respect to difference (b), it is noted that there is no disclosure in Brown et al. that the polymer composition is an ink jet ink as required in present claim 10.

However, applicants attention is drawn to MPEP 2111.02 which states that “if the body of a claim fully and intrinsically sets forth all the limitations of the claimed invention, and the preamble merely states, for example, the purpose or intended use of the invention, rather than any distinct definition of any of the claimed invention’s limitations, then the preamble is not considered a limitation and is of no significance to claim construction”. Further, MPEP 2111.02 states that statements in the preamble reciting the purpose or intended use of the claimed invention must be evaluated to determine whether the purpose or intended use results in a structural difference between the claimed invention and the prior art. Only if such structural difference exists, does the recitation serve to limit the claim. If the prior art structure is capable of performing the intended use, then it meets the claim.

It is the examiner’s position that the preamble does not state any distinct definition of any of the claimed invention’s limitations and further that the purpose or intended use, i.e. ink jet ink, recited in the present claims does not result in a structural difference between the presently claimed invention and the prior art composition and further that the prior art structure which is a composition identical to that set forth in the present claims is capable of performing the recited purpose or intended use. i.e. ink jet ink, presently claimed as required in the above cited portion of the MPEP, and thus, one of ordinary skill in the art would have arrived at the claimed invention.

Response to Arguments

15. Applicants argue that Brown et al. is no longer a relevant reference against the present claims given that there is no disclosure in Brown et al. of organic colorant as now required in all the present claims.

It is agreed that while Brown et al. disclose the use of white and colored inorganic pigment, there is no explicit disclosure of organic colorant. However, this is why Brown et al. is now applied against the present claims under 35 USC 103 in combination with Dersch et al.

Brown et al. does disclose the use of other pigment (paragraph 117). Dersch et al., which is drawn to pigmented coating composition comprising polymer particles comprised of polymerized units of phosphorous acid monomer and having first phosphorous acid groups, disclose the use of colored organic pigment in addition to inorganic pigment in order to adjust the hiding power, the shade, and the depth of color of the composition (col.10, lines 11-16).

Thus, given that Brown et al. disclose the use of inorganic pigment and other pigments and given that Dersch et al. provide motivation for using colored organic pigment in combination with inorganic pigment, it is the examiner's position that it would have been obvious to one of ordinary skill in the art to use colored organic pigment in the ink of Brown et al. in order to produce ink with desired hiding powder, shade, and color depth, and thereby arrive at the claimed invention.

Applicants point to the comparative data set forth in Tables 2.2-2.4 and 3.2 of the present specification and note that the data show there is an increased efficiency of organic pigments in paints using the presently claimed polymer composition.

However, it is the examiner's position that the data is not persuasive in establishing unexpected or surprising results over the cited prior.

Specifically, the data compares composition of present invention, i.e. comprising polymer particles comprised of polymerized units of phosphorous acid monomers and organic pigment (example 2), with composition outside the scope of the present claims, i.e. comprising organic pigment but no polymer particles comprises of polymerized units of phosphorous acid monomers (composition B). It is shown that the composition of the present invention has larger saturation values, increased light scattering and light absorption, less variation in tinting strength and better color acceptance. However, the data is not persuasive given that the prior art already disclose the criticality of using polymer particles comprised of polymerized units of phosphorous acid monomers. That is, Brown et al. already disclose composition comprising polymer particles comprised of polymerized units of phosphorous acid monomers. Thus, the comparative data is not only outside the scope of the present claims but outside the scope of Brown et al. Further, given that Brown et al. in combination with Dersch et al. disclose composition as presently claimed, it is clear that such composition would intrinsically exhibit the same increase in efficiency of organic pigment as the composition of the present invention.

Similarly, with respect to the double patenting rejection of record, applicants argue that the rejection should be withdrawn given that there is no disclosure in copending 10/642,791(Brown et al.) of organic pigment. It is agreed that there is no explicit disclosure in 10/642,791 of organic colorant. However, this is why 10/642,791 is now applied against the present claims in combination with Dersch et al. that disclose organic colorant as presently claimed.

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16. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a).

Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

17. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Callie E. Shosho whose telephone number is 571-272-1123. The examiner can normally be reached on Monday-Friday (6:30-4:00) Alternate Fridays Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vasu Jagannathan can be reached on 571-272-1119. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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